

## 5. Dean

**Program Name:** Dean.java

**Input File:** dean.dat

Your friend Dean has recently learned about Palindromes in his CS1 class. As he explains to you, a Palindrome is any string that is the same forwards and backward. Naturally, this includes a single character. Dean has been going through random books and picking out sentences, smashing them together, and counting the number of substrings that are palindromes. A substring, as he also explains to you, is any continuous run of characters in a string.

**Input:** The first input line will contain a number  $N$  ( $1 \leq N \leq 10$ ) defining the number of strings to check. The following  $N$  lines will contain a single string. The length of each string will be a whole number  $M$  such that  $1 \leq M \leq 10^5$ .

**Output:** Output the number of substrings that are palindromic for each string.

**Sample input:**

```
3
abc
aaa
213
```

**Sample output:**

```
3
6
3
```